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EXAMINER	
HASAN, SYED Y	

ART UNIT	PAPER NUMBER
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/500,401	OIWA ET AL.	
	Examiner	Art Unit	
	SYED Y. HASAN	2621	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *24 May 2010*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1, 4 - 11 and 14 - 20* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1, 4 - 11 and 14 - 20* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☒ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 05/24/2010 has been entered.

Response to Arguments

2. Applicant's arguments with respect to claims 1, 4 – 11 and 14 - 20 filed on 05/24/2010 have been considered but are moot in view of the new ground(s) of rejection.

In re page 10 applicant argues with respect to claim 1 that "Applicants respectfully disagree that Utsonomiya teaches storing end information. The passages of Utsonomiya cited by the Examiner merely indicate that end information may be received from a user. *(4/13/10 Office Action,* p.3). Nothing indicates that this received end information is stored in a data storage domain corresponding to an individual piece of reproduction procedure information. Utsonomiya only teaches that consecutive recording information is stored. *(Utsonomiya,* [[[0048]-[0049]). With respect to end information, Utsonomiya describes that in the event a user sends a recording stop request to the recorder/player, the recorder/player in turn transmits this request to further devices. *(Id.,* at [[0058]). For at least this reason, Applicants maintain that the claims of the present application are patentable over Utsonomiya and the other cited references."

In response examiner presents the disclosure of Chung et al (US 2001/0054168). Chung et al discloses "if the end portion of a file is not filled with as much data as in a minimum contiguous storage block as shown in FIG. 5, even when the file is recorded according to the condition of the minimum contiguous storage block, an attribute representing that data blocks for the unfilled area are allocated but not recorded is stored as real time recording/reproduction information, thus allowing real time playback upon additional recording." (para 0066, illustrates storing end information). Also "As shown in FIG. 3B, real time recording/reproduction attribute information for each file can be stored in a predetermined area (information area) in each file. For example, in the case of a real time rewritable (RTRW) format, real time recording/reproduction attribute information can be stored in." (para 0040 illustrates storing data file names). Also "Real time recording/reproduction file indication information (e.g., identifier="AV file") representing that a file requires real time recording/reproduction is included in the real time recording/reproduction attribute information. Among information on the size of the minimum contiguous storage block satisfying the condition of expression 1, reproduction time information for ensuring minimum contiguous storage, recording/reproduction bit rate information, and information on the contiguous recording/reproduction type, at least one can be stored in the real time recording/reproduction attribute information." (para 0043 illustrates time information and attribute information which is the same as header information see fig 6).

Therefore independent claims 1, 8, 11 and 18 and their dependent claims stay rejected.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

4. Claims 1, 4 – 7, 11 and 14 – 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Utsunomiya et al (US 2002/0066113) in view of Arai (US 6169844) and further in view of Chung et al (US 2001/0054168)

Regarding **claim 1** Utsunomiya et al discloses an information recording apparatus for executing a data recordation process (fig 1) the information recording apparatus comprising:

a plurality of information recording means for recording data (fig 1, item 3 and 4, para 0039) and

a recordation control process executing section for executing a data recordation process to the information recording means (fig 1, para 0051, flow of control signals) and for executing a process of generating control information during data reproduction (fig 8, para 0071)

the control information, including reproduction procedure information in which a procedure for reproducing data is stored and reproduction management information in which link information to the reproduction procedure information is stored (fig 11, paras 0084 - 0086)

wherein in the case of continuously executing a data recordation process to at

least another of the plurality of information recording means (fig 1, item 3 and 4) a plurality of pieces of reproduction procedure information are generated corresponding respectively to the plurality of information recording means (fig 8, para 0071) and link information to the plurality of pieces of reproduction procedure information is stored to one piece of the reproduction management information (fig 11, para 0083 and 0084)

wherein the recordation control process executing section is adapted to store continue information representative of whether recording a same content continuously to a next piece of reproduction procedure information, to storage domains corresponding to individual pieces of reproduction procedure information (paras 0048, 0049 and 0055)

However Utsunomiya et al does not disclose a recordation control process executing section for executing a selection process to select a recording medium based on available capacities of the information recording means, to store end information, representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information, in a data storage domain corresponding to an individual piece of reproduction procedure information and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names, time information, and video/audio header information are stored

On the other hand Arai teaches a recordation control process executing section for executing a selection process to select a recording medium based on available capacities of the information recording means (col 10, 27 – 43 illustrates a selection process to select a recording medium based on available capacity of recording medium)

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate a recordation control process executing section for executing a selection process to select a recording medium based on available capacities of the

information recording means as taught by Arai in the system of Utsunomiya et al in order to reliably record the data on the recording medium.

The combination of Utsunomiya et al and Arai do not disclose to store end representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information, in a data storage domain corresponding to an individual piece of reproduction procedure information and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names, time information, and video/audio header information are stored

However Chung et al teaches to store end representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information, in a data storage domain corresponding to an individual piece of reproduction procedure information (para 0066) and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names (para 0040) time information, and video/audio header information are stored (para 0043, see argument above)

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate to store end information, representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information, in a data storage domain corresponding to an individual piece of reproduction procedure information and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names, time information, and video/audio header information are stored as taught by Chung et al in the combined system of Utsunomiya et al and Arai in

order to accurately store real time recording/reproduction information for real time files.

Regarding **claim 4** Utsunomiya et al discloses an information recordation apparatus, wherein the recordation control process executing section (fig 3, 10, control unit) is adapted to store, in each piece of the reproduction procedure information, management information on data continuously recorded on one recording medium, and information enabling a storage position of the data to be determined (fig 11, paras 0084 – 0086, illustrates location of storage)

Regarding **claim 5** Utsunomiya et al discloses an information recordation apparatus, wherein the recordation control process executing section is adapted to compare an available capacity for recording data between the plurality of information recording means, and select information recording means having a greater available capacity for data recordation (fig 4 and 5, para 0054, available capacity monitored)

Regarding **claim 6** Utsunomiya et al discloses an information recordation apparatus, wherein the recordation control process executing section is adapted to compare a remaining capacity of the information recording means under data recording with a preset threshold, and execute continuously a data recordation process to another information recording means on condition that the remaining capacity becomes less than the threshold (fig 5, para 0056, continue recording)

Regarding **claim 7** Utsunomiya et al discloses an information recordation apparatus, wherein the recordation control process executing section is adapted to generate first reproduction procedure information when commencing a data recordation process to the information recording means, and store link information to the first reproduction procedure information to the reproduction management information (see claim 1 above) and generate new second reproduction procedure information in the case of executing continuing data recording to different information recording means, store link information to the second reproduction procedure information to the

reproduction management information, and set continue information representative of having next reproduction procedure information to the first reproduction procedure information (fig 4 and 5, S10 continue record in VCR 2)

Method **claims 11 and 14 – 17** are rejected based on apparatus claims 1 and 4 and 7 respectively.

5. Claims 8 - 10 and 18 – 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Utsunomiya et al (US 2002/0066113) in view of Koyama et al (US 61122010) and further in view of Chung et al (US 2001/0054168)

Regarding **claim 8** Utsunomiya et al discloses an information reproduction apparatus for executing a data reproducing process (fig 1) the information reproduction apparatus comprising:

a plurality of information recording means for subject-of-reproducing data (fig 1, item 3 and 4, para 0039) and

a reproduction control process executing section for executing a reproducing process of data continuously stored on the information recording means, depending upon control information (fig 8, para 0071)

the control information including reproduction procedure information in which a procedure for reproducing data is recorded and reproduction management information in which link information to the corresponding reproduction procedure information is stored (see claim 1 above)

wherein in a case that there are a plurality of pieces of reproduction procedure information linked to the reproduction management information (fig 1, item 3 and 4) the plurality of pieces of reproduction procedure information are switched in order and applied as control information (fig 8, para 0071) and reproduction-of-subject data is acquired from different information recording means based on an individual piece of

reproduction procedure information (fig 11, para 0083 and 0084)

wherein the reproduction management information stores, in a data storage domain corresponding to each piece of reproduction procedure information, continue information representative of whether recording a same content continuously to next pieces of reproduction procedure information (paras 0048, 0049 and 0055, see argument above) and the reproduction management information stores, in a data storage domain corresponding to an individual piece of reproduction procedure information, (para 0075)

However Utsunomiya et al does not disclose each of the plurality of information recording means stores management information about content recorded on at least one different recording medium, end information representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names, time information, and video/audio header information are stored

On the other hand Koyama et al teaches each of the plurality of information recording means stores management information about content recorded on at least one different recording medium (col 3, lines 26 – 43 illustrates plurality of information recording means and col 80, lines 19 – 24 and col 81, lines 10 – 19 illustrate storing on a different recording medium)

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate each of the plurality of information recording means stores management information about content recorded on at least one different recording medium as taught by Koyama et al in the system of Utsunomiya et al in order to effectively utilize recording area of the recording medium and facilitate the management

of the recorded picture.

The combination of Utsunomiya et al and Koyama et al do not disclose end representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information, in a data storage domain corresponding to an individual piece of reproduction procedure information and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names, time information, and video/audio header information are stored

However Chung et al teaches end representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information, in a data storage domain corresponding to an individual piece of reproduction procedure information (para 0066) and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names (para 0040) time information, and video/audio header information are stored (para 0043, see argument above)

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate end information, representative of whether a piece of reproduction procedure information is a final piece of reproduction procedure information, in a data storage domain corresponding to an individual piece of reproduction procedure information and reproduction management information in which link information to the reproduction procedure information, video/audio section data file names, time information, and video/audio header information are stored as taught by Chung et al in the combined system of Utsunomiya et al and Koyama et al in order to accurately store real time recording/reproduction information for real time

files.

Regarding **claim 9** Utsunomiya et al discloses an information reproduction apparatus, wherein the reproduction control process executing section is adapted to determine whether to continuously execute reproduction control depending upon the continue information in the reproduction management information for the piece of reproduction procedure information corresponding to the data under reproduction (fig 6, reproduction)

Regarding **claim 10** Utsunomiya et al discloses an information reproduction apparatus, wherein the reproduction control process executing section (fig 6, 10, control unit) is adapted to acquire, is adapted to from the reproduction procedure information, management information on data continuously recorded on one recording medium and information enabling a storage position of the data to be determined (fig 11, para 0084 – 0086)

Method **claims 18 – 20** are rejected based on apparatus claims 8 – 10 respectively

Conclusion

6. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure

Horii et al (US 2003/0081515) discloses information recording medium, and apparatus and information reproducing apparatus and copying apparatus.

Kotani (US 2002/0159186) discloses an information data reproducing apparatus

Matoba et al (US 2002/0097986) discloses a broadcast storage system with reduced users control actions.

Ino et al (US 6292626) discloses a reproducing and recording apparatus.

Iitsuka (US 5415686) discloses a data playback apparatus for realizing high transfer data.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to SYED Y. HASAN whose telephone number is (571)270-1082. The examiner can normally be reached on 9/8/5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Thai Tran can be reached on 571-272-7382. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/S. Y. H./
06/17/2010

/Thai Tran/
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